

4. On a Specimen of the White Bream (*Abramis blicca*, Bloch) without Pelvic Fins. By H. H. BRINDLEY, M.A., St. John's College, Cambridge.

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(Plate X.)

The fish forming the subject of this communication was obtained from the Cam last August. It is a specimen of *Abramis blicca*, Bl., of which the commonest English name, the "White Bream," distinguishes the species from the Common or Yellow Bream (*A. brama*). The former fish is described by Jenyns¹ as "very common in the Cam" and as the "Breamflat" of the fen fishermen. The specimen exhibits all the appropriate specific characters except as regards the pelvic fins, which are altogether absent. A normal example of the species was captured at the same place and during the same hour, and for the sake of comparison an outline of it is given below the figure of the abnormal fish.

In the normal example the ventral surface from below the posterior edge of the operculum to the origin of the pelvic fins is flattened and is covered by four rows of scales, the scales of the two outer rows having their outer edges bent upwards to interlock with the scales of the lowest rows of the sides of the body and so round off the sides of the ventral surface. Posteriorly to the pelvic fins the ventral surface suddenly becomes sharp or rather ceases to be present, the ventral edges of the scales in the lowest rows of the sides of the body meeting in the ventral line.

This ventral compression of the body into an edge behind the pelvic fins is a generic character².

The above are also features of the abnormal example, subject to the following modification at the proper place of origin of the pelvic fins. The four last scales of each row of the posterior end of the flattened portion of the ventral surface are of about the same size and shape as the antecedent scales, but overlap each other much more than the latter, viz. to the extent of about two-thirds of their individual areas. These scales are, however, arranged regularly and cover completely the proper place of origin of the absent fins.

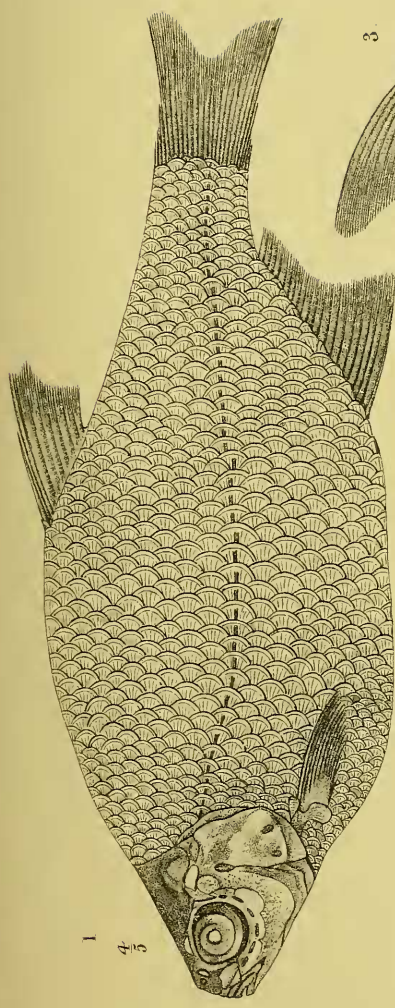
Dissection of the body-wall in this region, by stripping off the different layers one by one, revealed no irregularity of arrangement, the myocommas meeting in the ventral line in the same manner as in the rest of the region between the pectoral and anal fins.

On macerating the muscles, no trace of a pelvic girdle was found.

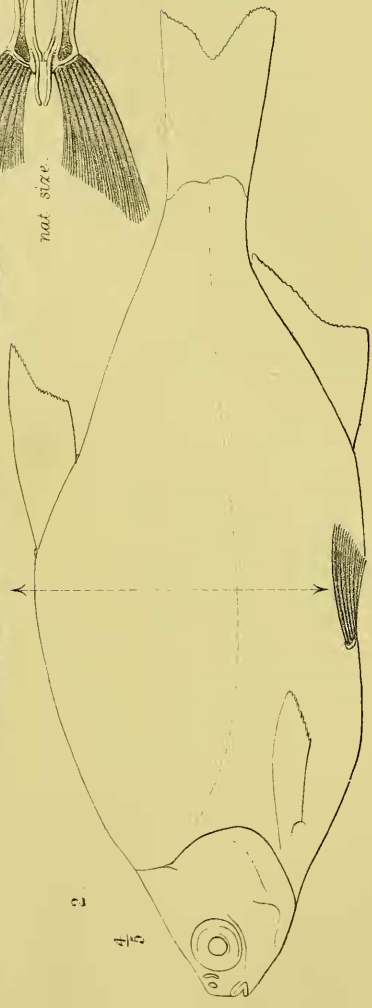
The case is therefore one of entire absence of the pelvic girdle and appendages, their presence normally not being suggested by any rudiments. That the defect is congenital and not the result of accidental injury, which would be unlikely on other grounds, is indicated by the absence of any external mark or scar and the complete regularity in the musculature.

¹ L. Jenyns, 'Manual of British Vertebrate Animals,' 1825.

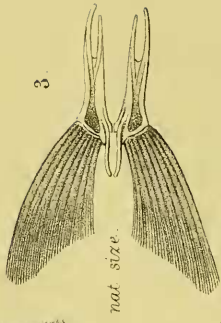
² A. Günther, 'Catalogue of Fishes in British Museum,' vol. vii. p. 300.



1
 $\frac{4}{5}$



2
 $\frac{4}{5}$



3.

nat. size.

ABRAMIS BLICCA.